

## **AMENDMENTS TO THE SPECIFICATION**

Please replace Paragraph [0003] with the following paragraph rewritten in amendment format:

The oxide based ceramic matrix composites (CMC) developed are economic, low dielectric, thermally stable, structural ceramic systems stable to at least 2300 °F. The matrix is reinforceable with a variety of fibers (Quartz, Nextel 312, 550, ~~6196~~10, 650, 720). Preferably the fiber is, but not limited to, Nextel 720. The CMC's primary advantage over carbon-carbon and other high temperature composites is its low cost and near net-shape manufacturing process.

Please replace Paragraph [0029] with the following paragraph rewritten in amendment format:

Alumina-coated Silica Sol (1056, Nalco Chemicals) containing 20 30% solids of colloidal silica ( $\text{SiO}_2$ ) coated with alumina ( $\text{Al}_2\text{O}_3$ ) in water was mixed in a blender with submicron alumina powder (SM-8, Baikowski). The matrix contained 57 wt% of alumina-coated silica sol and 43 wt% of alumina powder. Several drops of nitric acid (about 0.1%) were added to the matrix to balance the pH. The matrix was then ball milled with alumina media for 4 hours before infiltrating into the fabric. The fabric was infiltrated by the same method as described in Example 1.

Please replace Paragraph [0030] with the following paragraph rewritten in amendment format:

Silica Sol (2327, Nalco Chemicals) containing ~~20~~ 40% solids of colloidal silica ( $\text{SiO}_2$ ) in water was mixed in a blender with submicron alumina powder (SM-8, Baikowski). The matrix contained 57 wt% of silica sol and 43 wt% of alumina powder. Several drops of nitric acid (about 0.1%) were added to the matrix to balance the pH. The matrix was then ball milled with alumina media for 4 hours before infiltrating into the fabric. The fabric was infiltrated by the same method as described in Example 1.